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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/719,017	11/24/2003	Shuji Fujii	PRON: 002	9160

27890 7590 05/06/2005

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WASHINGTON, DC 20036

EXAMINER

LEE, JINHEE J

ART UNIT	PAPER NUMBER
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2831

DATE MAILED: 05/06/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

AK

Office Action Summary

Application No.

10/719,017

Applicant(s)

FUJII, SHUJI

Examiner

Jinhee J. Lee

Art Unit

2831

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 17 March 2005 and 20 April 2005.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 4-12 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 4-12 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 4-10 are rejected under 35 U.S.C. 102(b) as being anticipated by Paw et al. (US005821486A).

Re claim 4, Paw et al. discloses a polymer insulator apparatus comprising a rigidly connected rectangular structure comprising plural polymer post insulators (30 and 18), a supporting structure (20) and a plate member (non-moving part below the moving part of switch blade 24), wherein a first end of each polymer post insulator is rigidly connected to said supporting structure, and a second end of each said polymer post insulators is rigidly connected to said plate member, (see figures 1 and 2).

Re claim 5, Paw et al. discloses a method for mounting plural polymer post insulators on a supporting structure, comprising: providing a supporting structure (20) and plural polymer post insulators (18, 30); rigidly connecting a first end of each said plural polymer post insulator to the supporting structure; and rigidly connecting a second end of each said plural polymer post insulator whereby said plural polymer post insulators are parallel to each other and normal to the supporting structure, thereby forming a rigidly connected rectangular structure (see figures 1 and 2). Note that it has been held that the functional "whereby" statement does not define any structure and

accordingly cannot serve to distinguish. *In re Mason*, 114 USPQ 127, 44 CCPA 937 (1957).

Re claim 6, Paw et al. discloses a method wherein said first end of each said polymer post insulator is connected to said supporting structure by a first rigid body (unnumbered, bottom part of 18, 30 for example) comprising a part of said polymer post insulator, and said second end of each said polymer post insulator is connected to a plate member by a second rigid body (unnumbered, top part of 18 or 30 for example) comprising a part of said polymer post insulator (see figures 1 and 2).

Re claim 7, Paw et al. discloses a method wherein said connecting of the first end and said connecting of the second end, each comprise a rigid connection (see figures 1 and 2).

Re claim 8, Paw et al. discloses a method wherein when an axial direction along a length of each said plural polymer post insulator is substantially a horizontal direction and an axial direction along a length of said supporting structure is substantially a vertical direction, then said plural polymer post insulators are for supporting a weight of a load acting in the vertical direction (see figures 1 and 2).

Re claim 9, Paw et al. discloses a polymer insulator apparatus wherein said supporting structure is configured for operating with an electric power transmission line (see column 1 lines 6-8 according to the numbering in the middle).

Re claim 10, Paw et al. discloses a method wherein said supporting structure is configured for operating with an electric power transmission line (see column 1 lines 6-8 according to the numbering in the middle).

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 11 and 12 are rejected under 35 U.S.C. 103(a) as being unpatentable over Paw et al. in view of Austin (US001863080).

Re claim 11, Paw et al. substantially discloses a polymer insulator apparatus comprising a rigidly connected rectangular structure comprising plural polymer post insulators (30 and 18), a supporting structure (20) and a plate member (non-moving part below the moving part of switch blade 24), wherein a first end of each polymer post insulator is rigidly connected to said supporting structure, and a second end of each said polymer post insulators is rigidly connected to said plate member. Paw et al. does not explicitly disclose wherein said supporting structure is selected from the group consisting of a steel pole, a wood pole or a steel tower. However, Austin teaches of supporting structure selected from the group consisting of a steel pole, a wood pole or a steel tower (see figure 1). It would have been obvious to one having ordinary skill in the art at the time the invention was made to use supporting structure selected from the group consisting of a steel pole, a wood pole or a steel tower of Austin with the insulators of Paw et al. in order to provide the supporting structure for the insulators.

Re claim 12, Paw et al. substantially discloses a method for mounting plural polymer post insulators on a supporting structure, comprising: providing a supporting

structure (20) and plural polymer post insulators (18, 30); rigidly connecting a first end of each said plural polymer post insulator to the supporting structure; and rigidly connecting a second end of each said plural polymer post insulator whereby said plural polymer post insulators are parallel to each other and normal to the supporting structure, thereby forming a rigidly connected rectangular structure. Paw et al. does not explicitly disclose wherein said supporting structure is selected from the group consisting of a steel pole, a wood pole or a steel tower. However, Austin teaches of supporting structure selected from the group consisting of a steel pole, a wood pole or a steel tower (see figure 1). It would have been obvious to one having ordinary skill in the art at the time the invention was made to use supporting structure selected from the group consisting of a steel pole, a wood pole or a steel tower of Austin with the insulators of Paw et al. in order to provide the supporting structure for the insulators. Note that it has been held that the functional "whereby" statement does not define any structure and accordingly cannot serve to distinguish. *In re Mason*, 114 USPQ 127, 44 CCPA 937 (1957).

Response to Arguments

5. Applicant's arguments filed 3/17/05 have been fully considered but they are not persuasive.

In response to applicant's arguments that Paw et al. does not teach "a second end of each said polymer post insulators is rigidly connected to said plate member," examiner disagrees. The plate member of Paw et al. is the non-moving part under the moving part of the switch blade 24, which is rigidly connected as claimed.

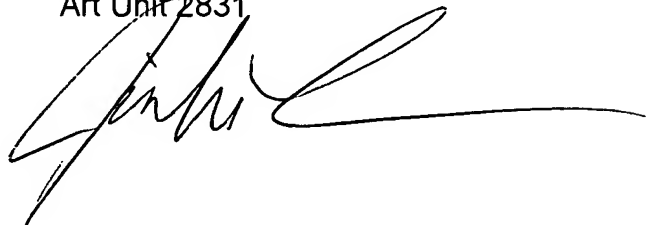
Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jinhee J. Lee whose telephone number is 571-272-1977. The examiner can normally be reached on M, T, Th and F at 6:30AM-5PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Dean A. Reichard can be reached on 571-272-2800 ext. 31. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Jinhee J Lee
Patent Examiner
Art Unit 2831

A handwritten signature in black ink, appearing to read 'Jinhee J. Lee', written over the printed name and title.

jjl